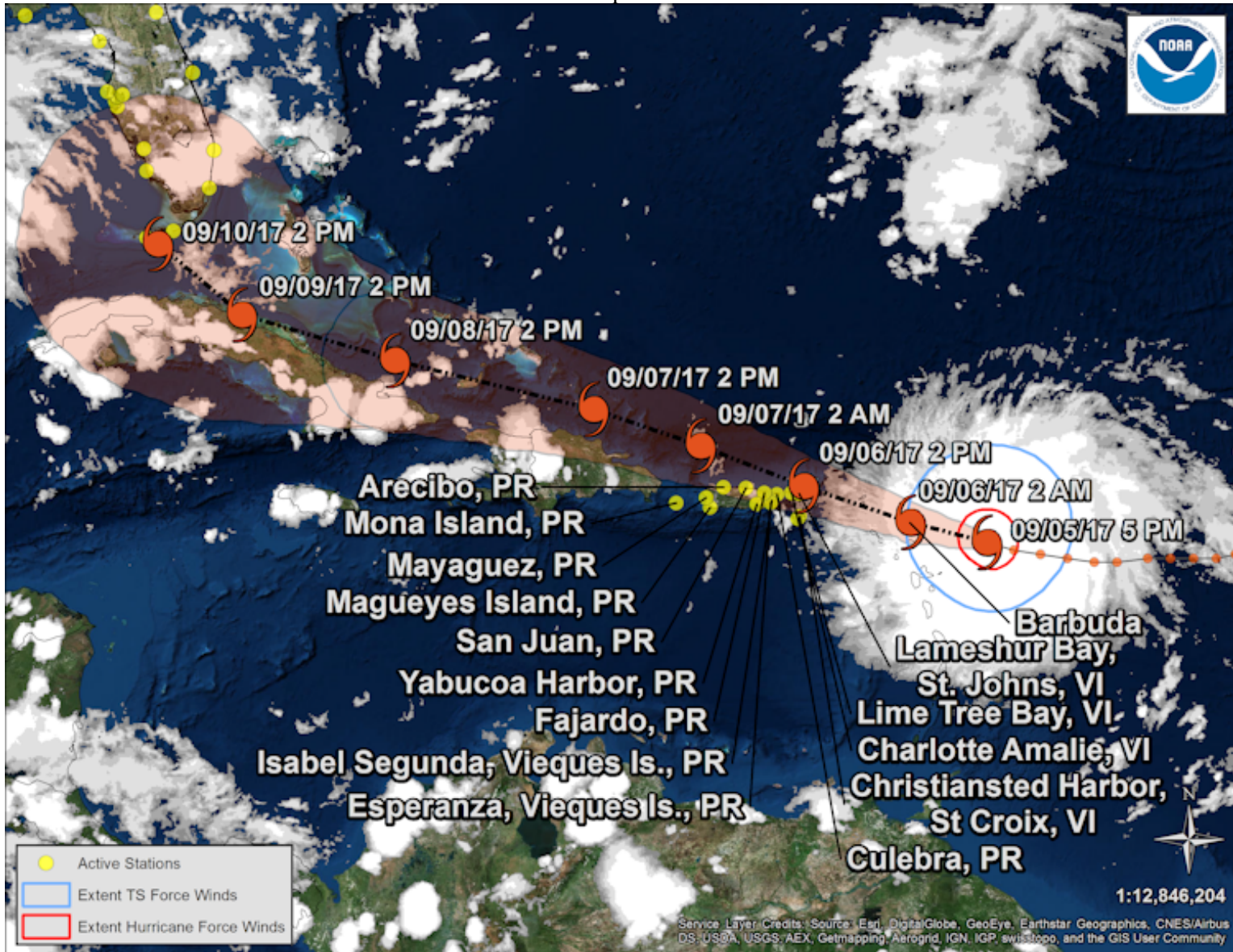


# Hurricane IRMA QuickLook Posted: 18:00 AST 09/05/2017

## NOAA and NOAA Partnership Stations Relative to the Storm



## Storm Analysis

As of 09/05/2017 18:00 AST, water levels at Barbuda and across Puerto Rico and the U.S. Virgin Islands are slowly rising. Water levels at Barbuda have reached between 0.6 and 0.7 feet above normal tide levels over the past hour. Water levels across the U.S. Virgin Islands and Puerto Rico are elevated by 0.5 feet or less above tidal predictions.

Winds are also slowly increasing across Barbuda, the U.S. Virgin Islands and eastern Puerto Rico with speeds between 10 and 15 knots and intermittent gusts of 20 to 25 knots.

Barometric pressure continues to fall across the region.

Water Level and Meteorological plots available below are updated automatically. A line denoting Mean Higher High Water (MHHW) is displayed to provide an approximate indication of when flooding inundation may occur.

For additional data, please see the Center for Operational Oceanographic Products & Services website. For more information or archived products and reports, please see the Storm QuickLook Homepage.

Analyst: PFF

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SELECT NATIONAL HURRICANE CENTER ADVISORY INFORMATION:

Hurricane Irma Advisory Number 27  
NWS National Hurricane Center Miami FL AL112017  
500 PM AST Tue Sep 05 2017

...POTENTIALLY CATASTROPHIC CATEGORY 5 HURRICANE IRMA NEARING THE NORTHERN  
LEEWARD ISLANDS...  
...WEATHER CONDITIONS WILL DETERIORATE OVER THE NORTHERN LEEWARD ISLANDS SOON...

SUMMARY OF 500 PM AST...2100 UTC...INFORMATION

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LOCATION...17.1N 59.8W  
ABOUT 130 MI...210 KM E OF ANTIGUA  
ABOUT 135 MI...220 KM ESE OF BARBUDA  
MAXIMUM SUSTAINED WINDS...185 MPH...295 KM/H  
PRESENT MOVEMENT...W OR 280 DEGREES AT 15 MPH...24 KM/H  
MINIMUM CENTRAL PRESSURE...926 MB...27.35 INCHES

WATCHES AND WARNINGS

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CHANGES WITH THIS ADVISORY:

The government of the Dominican Republic has issued a Hurricane Warning along the north coast of the Dominican Republic from the border with Haiti eastward to Cabo Engano. A tropical storm warning has been issued for the south coast of the Dominican Republic from south of Cabo Engano westward to the southern border with Haiti.

SUMMARY OF WATCHES AND WARNINGS IN EFFECT:

A Hurricane Warning is in effect for...  
\* Antigua, Barbuda, Anguilla, Montserrat, St. Kitts, and Nevis  
\* Saba, St. Eustatius, and Sint Maarten  
\* Saint Martin and Saint Barthelemy  
\* British Virgin Islands  
\* U.S. Virgin Islands  
\* Puerto Rico, Vieques, and Culebra

\* Dominican Republic from Cabo Engano to the northern border with Haiti

A Hurricane Watch is in effect for...

\* Guadeloupe

\* Haiti from the northern border with the Dominican Republic to Le Mole St. Nicholas

\* Turks and Caicos Islands

\* Southeastern Bahamas

A Tropical Storm Warning is in effect for...

\* Guadeloupe

\* Dominica

\* Dominican Republic from south of Cabo Engano westward to the southern border with Haiti

A Tropical Storm Watch is in effect for...

\* Haiti from south of Le Mole St. Nicholas to Port-Au-Prince

A Hurricane Warning means that hurricane conditions are expected somewhere within the warning area. A warning is typically issued 36 hours before the anticipated first occurrence of tropical-storm- force winds, conditions that make outside preparations difficult or dangerous. Preparations to protect life and property should be rushed to completion.

A Tropical Storm Warning means that tropical storm conditions are expected somewhere within the warning area.

A Tropical Storm Watch means that tropical storm conditions are possible within the watch area, generally within 48 hours.

Interests elsewhere in the Dominican Republic and Haiti, as well as Cuba, the central and northwestern Bahamas, and Florida should monitor the progress of Irma.

For storm information specific to your area in the United States, including possible inland watches and warnings, please monitor products issued by your local National Weather Service forecast office. For storm information specific to your area outside the United States, please monitor products issued by your national meteorological service.

## DISCUSSION AND 48-HOUR OUTLOOK

At 500 PM AST (2100 UTC), the distinct eye of Hurricane Irma was located near latitude 17.1 North, longitude 59.8 West. Irma is moving toward the west near 15 mph (24 km/h). A turn toward the west-northwest is forecast to begin tonight and continue for the next couple of days. On the forecast track, the extremely dangerous core of Irma will move over portions of the northern Leeward Islands tonight and early Wednesday, move near or over portions of the northern Virgin Islands Wednesday, and pass near or just north of Puerto Rico late Wednesday and Wednesday night.

Maximum sustained winds are near 185 mph (295 km/h) with higher gusts. Irma is an extremely dangerous category 5 hurricane on the Saffir-Simpson Hurricane Wind Scale. Some fluctuations in intensity are likely during the next day or two, but Irma is forecast to remain a powerful category 4 or 5 hurricane during the next couple of days.

Hurricane-force winds extend outward up to 60 miles (95 km) from the center and tropical-storm-force winds extend outward up to 175 miles (280 km).

The estimated minimum central pressure is 926 mb (27.35 inches).

## HAZARDS AFFECTING LAND

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**STORM SURGE:** The combination of a life-threatening storm surge and large breaking waves will raise water levels **ABOVE NORMAL TIDE LEVELS** by the following amounts within the hurricane warning area near and to the north of the center of Irma. Near the coast, the surge will be accompanied by large and destructive waves.

Northern Leeward Islands...7 to 11 ft  
Turks and Caicos Islands...15 to 20 ft  
Southeastern Bahamas...15 to 20 ft  
Northern coast of the Dominican Republic...3 to 5 ft  
Northern coast of Haiti and the Gulf of Gonave...1 to 3 ft

The combination of a life-threatening storm surge and the tide will cause normally dry areas near the coast to be flooded by rising waters moving inland from the shoreline. The water is expected to reach the following **HEIGHTS ABOVE GROUND** if the peak surge occurs at the time of high tide...

British and U.S. Virgin Islands except St. Croix...7 to 11 ft  
Northern coast of Puerto Rico...3 to 5 ft  
Southern coast of Puerto Rico and St. Croix...1 to 2 ft

The deepest water will occur along the immediate coast in areas of onshore winds, where the surge will be accompanied by large and destructive waves. Surge-related flooding depends on the relative timing of the surge and the tidal cycle, and can vary greatly over short distances. For information specific to your area, please see products issued by your local National Weather Service forecast office.

**WIND:** Hurricane conditions are expected within the hurricane warning area in the Leeward Islands tonight, with tropical storm conditions beginning within the next few hours. Hurricane conditions are expected to begin within the hurricane warning area in the British and U.S. Virgin Islands and Puerto Rico on Wednesday, with tropical storm conditions beginning tonight. Hurricane conditions are expected to begin within the hurricane warning area in the Dominican Republic early Thursday, with tropical storm conditions beginning Wednesday night.

Hurricane and tropical storm conditions are possible within the watch area in Haiti, the Turks and Caicos Islands, and the southeastern Bahamas by early Thursday.

**RAINFALL:** Irma is expected to produce the following rain accumulations through Thursday:

Northern Leeward Islands...8 to 12 inches, isolated 20 inches  
Northeast Puerto Rico and the British and U.S. Virgin Islands except St. Croix...4 to 10 inches, isolated 15 inches  
Southwest Puerto Rico, the southern Leeward Islands, and St. Croix...2 to 4 inches

Irma is expected to produce the following rain accumulations Wednesday through Saturday:

Southeast Bahamas and Turks and Caicos...8 to 12 inches, isolated 20 inches  
Northern Dominican Republic and northern Haiti...4 to 10 inches, isolated 15 inches  
Southwest Haiti...1 to 4 inches

These rains could cause life-threatening flash floods and mudslides.

**SURF:** Swells generated by Irma will affect the northern Leeward Islands, Puerto Rico, the Virgin Islands, the southeastern Bahamas, the Turks and Caicos Islands, and the northern coast of the Dominican Republic during the next several days. These swells are likely to cause life-threatening surf and rip current conditions. Please consult

products from your local weather office.

#### NEXT ADVISORY

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Next intermediate advisory at 800 PM AST.

Next complete advisory at 1100 PM AST.

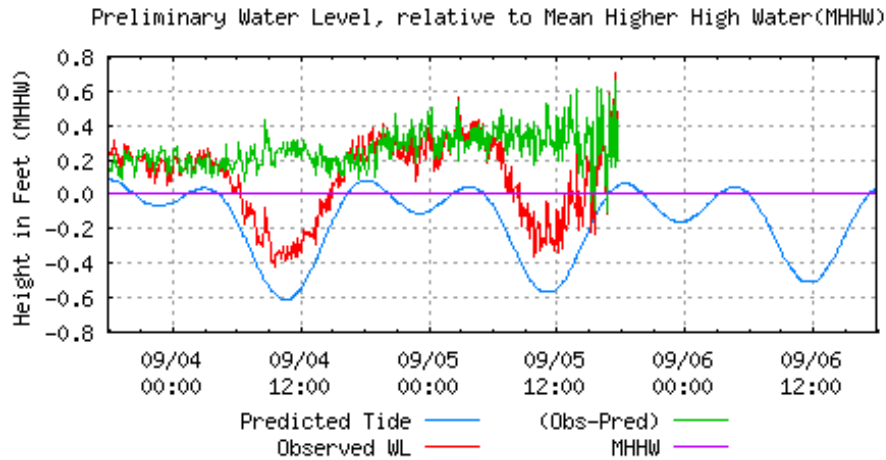
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Forecaster Brown

For the purpose of timely release, data contained within this QuickLook have undergone a "limited" NOS Quality Assurance/Control; however, the data have not yet undergone final verification. All data subject to NOS verification.

Jump to: Barbuda - Water Level, Barbuda - Winds, Barbuda - Barometric, Christiansted Harbor, St Croix - Water Level, Christiansted Harbor, St Croix - Winds, Christiansted Harbor, St Croix - Barometric, Lameshur Bay, St John - Water Level, Lime Tree Bay, St. Croix - Water Level, Lime Tree Bay, St. Croix - Winds, Lime Tree Bay, St. Croix - Barometric, Charlotte Amalie - Water Level, Charlotte Amalie - Winds, Culebra - Water Level, Isabel Segunda, Vieques Island - Water Level, Isabel Segunda, Vieques Island - Winds, Esperanza, Vieques Island - Water Level, Esperanza, Vieques Island - Winds, Fajardo - Water Level, Fajardo - Winds, Yabucoa Harbor - Water Level, Yabucoa Harbor - Winds, San Juan, La Puntilla, San Juan Bay - Water Level, San Juan, La Puntilla, San Juan Bay - Winds, San Juan, La Puntilla, San Juan Bay - Barometric, Arecibo - Water Level, Arecibo - Winds, Magueyes Island - Water Level, Magueyes Island - Winds, Mayaguez - Water Level, Mayaguez - Winds, Mona Island - Water Level, Mona Island - Barometric

NOAA/NOS/CO-OPS 9761115 Barbuda



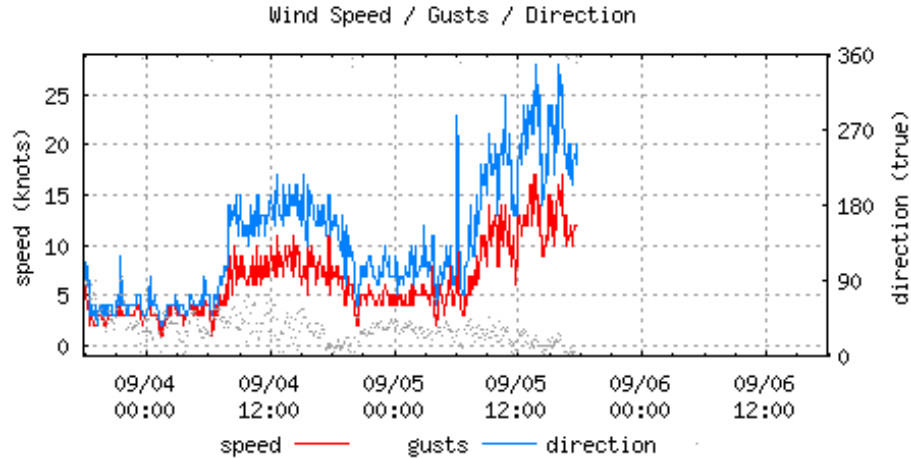
Last Observed Sample: 09/05/2017 17:48 (AST). Data relative to MHHW

Observed: 0.37 ft. Predicted: 0.05 ft. Residual: 0.32 ft.

Historical Maximum Water Level: Aug 23 2012, 1.05 ft.

Next High Tide: 09/05/2017 18:21 (AST), 0.06 ft.

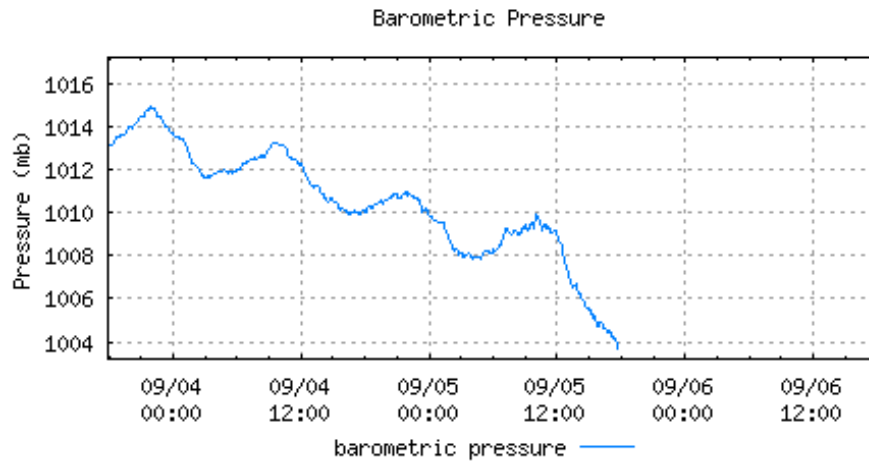
NOAA/NOS/CO-OPS 9761115 Barbuda



Last Observed Sample: 09/05/2017 17:48 (AST)

Wind Speed: 12 knots Gusts: 19 knots Direction: 357° T

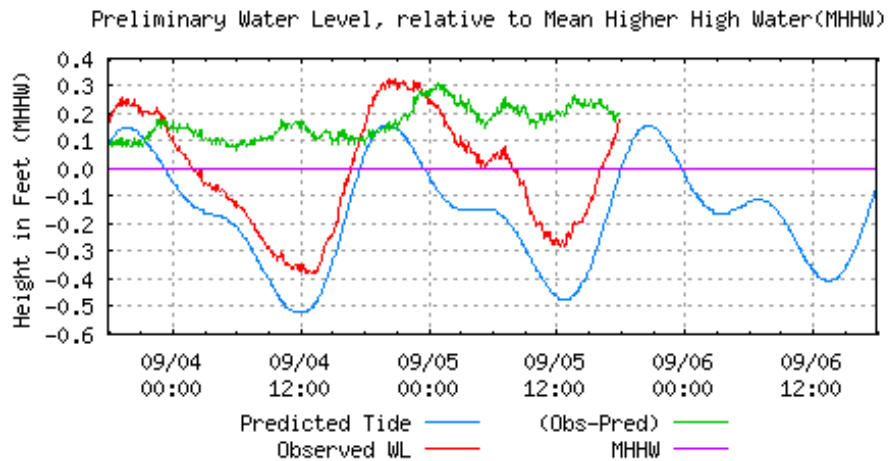
NOAA/NOS/CO-OPS 9761115 Barbuda



Last Observed Sample: 09/05/2017 17:48 (AST)

Barometric Pressure: 1003.7 mb

NOAA/NOS/CO-OPS 9751364 Christiansted Harbor, St Croix, VI



Last Observed Sample: 09/05/2017 17:48 (AST). Data relative to MHHW

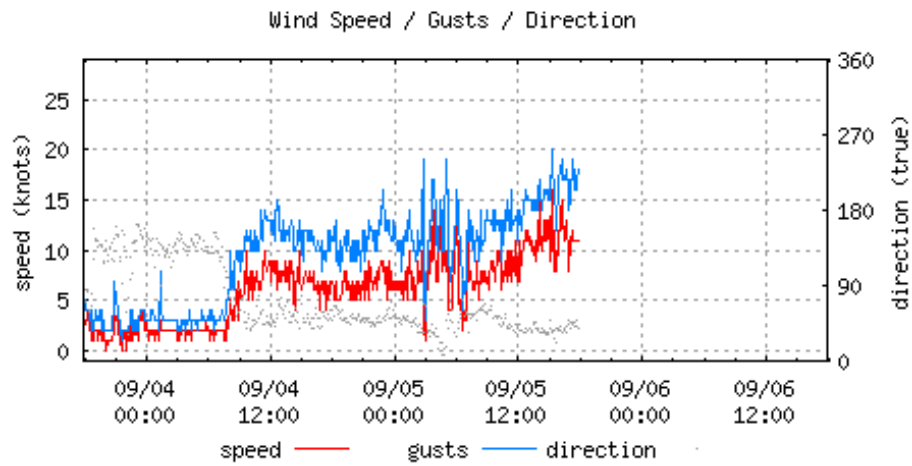
Observed: 0.18 ft. Predicted: -0.02 ft. Residual: 0.20 ft.

Historical Maximum Water Level: Oct 16 2008, 1.17 ft.

Next High Tide: 09/05/2017 20:32 (AST), 0.16 ft.



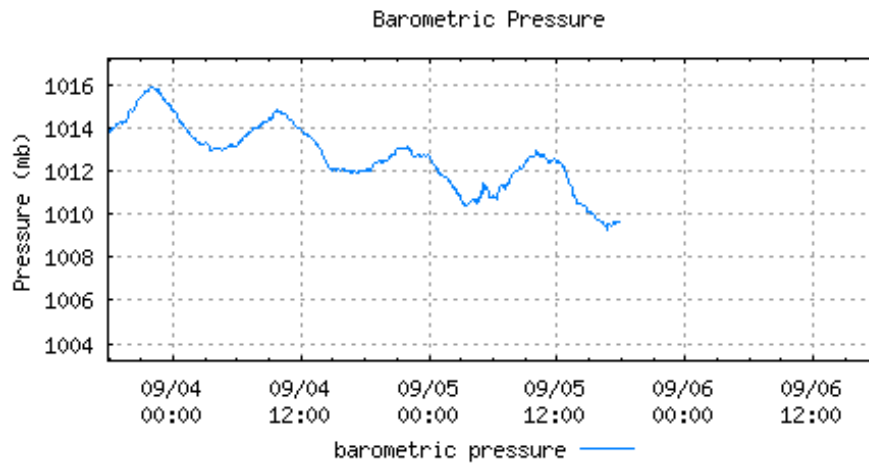
NOAA/NOS/CO-OPS 9751364 Christiansted Harbor, St Croix, VI



Last Observed Sample: 09/05/2017 17:48 (AST)

Wind Speed: 11 knots Gusts: 18 knots Direction: 40° T

NOAA/NOS/CO-OPS 9751364 Christiansted Harbor, St Croix, VI



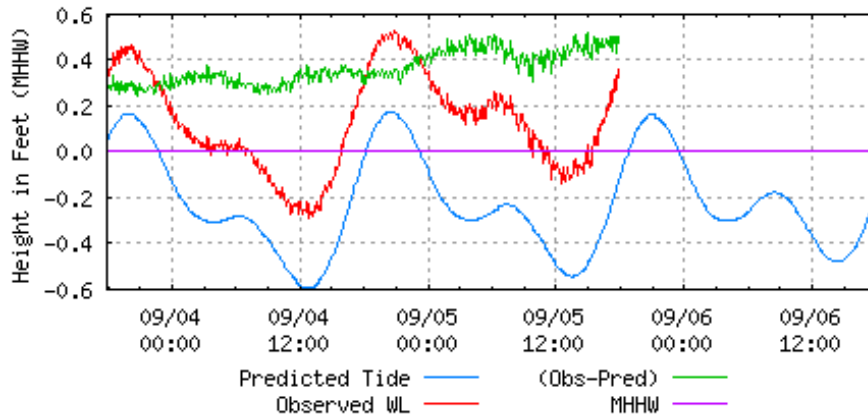
Last Observed Sample: 09/05/2017 17:48 (AST)

Barometric Pressure: 1009.6 mb



NOAA/NOS/CO-OPS 9751381 Lameshur Bay, St John, VI

Preliminary Water Level, relative to Mean Higher High Water(MHHW)



Last Observed Sample: 09/05/2017 17:54 (AST). Data relative to MHHW

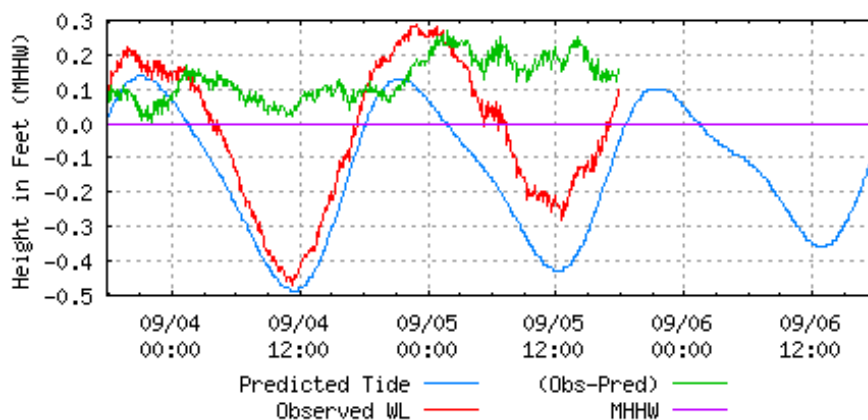
Observed: 0.39 ft. Predicted: -0.13 ft. Residual: 0.52 ft.

Historical Maximum Water Level: Aug 30 2010, 0.89 ft.

Next High Tide: 09/05/2017 20:58 (AST), 0.16 ft.

NOAA/NOS/CO-OPS 9751401 Lime Tree Bay, St. Croix, VI

Preliminary Water Level, relative to Mean Higher High Water(MHHW)



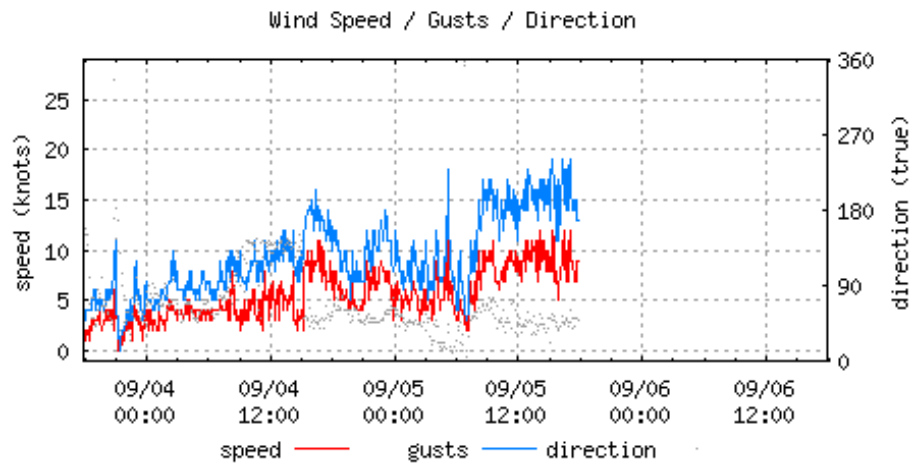
Last Observed Sample: 09/05/2017 17:48 (AST). Data relative to MHHW

Observed: 0.10 ft. Predicted: -0.06 ft. Residual: 0.16 ft.

Historical Maximum Water Level: Nov 17 1999, 1.88 ft.

Next High Tide: 09/05/2017 21:26 (AST), 0.11 ft.

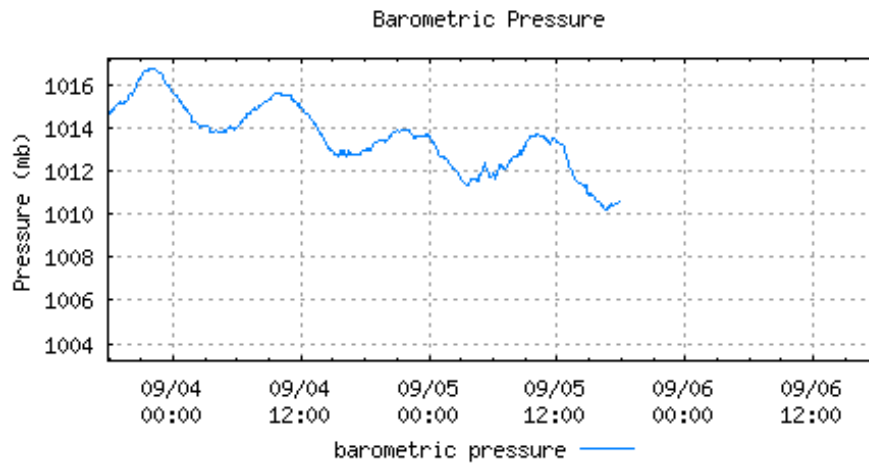
NOAA/NOS/CO-OPS 9751401 Lime Tree Bay, St. Croix, VI



Last Observed Sample: 09/05/2017 17:48 (AST)

Wind Speed: 9 knots Gusts: 13 knots Direction: 49° T

NOAA/NOS/CO-OPS 9751401 Lime Tree Bay, St. Croix, VI

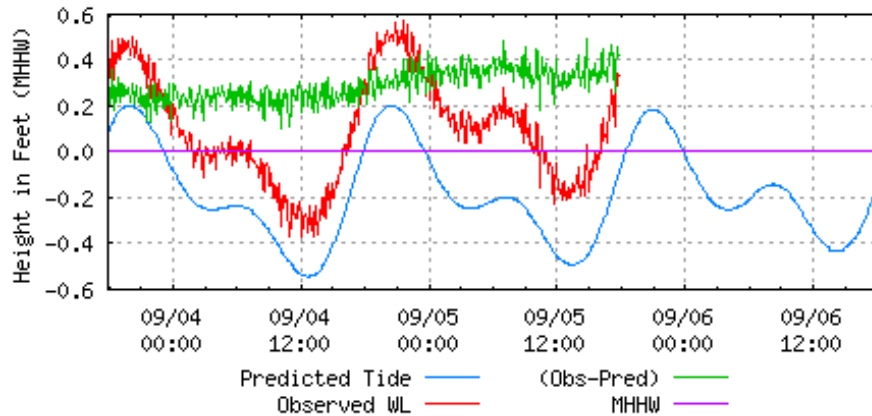


Last Observed Sample: 09/05/2017 17:48 (AST)

Barometric Pressure: 1010.6 mb

NOAA/NOS/CO-OPS 9751639 Charlotte Amalie, VI

Preliminary Water Level, relative to Mean Higher High Water(MHHW)



Last Observed Sample: 09/05/2017 17:48 (AST). Data relative to MHHW

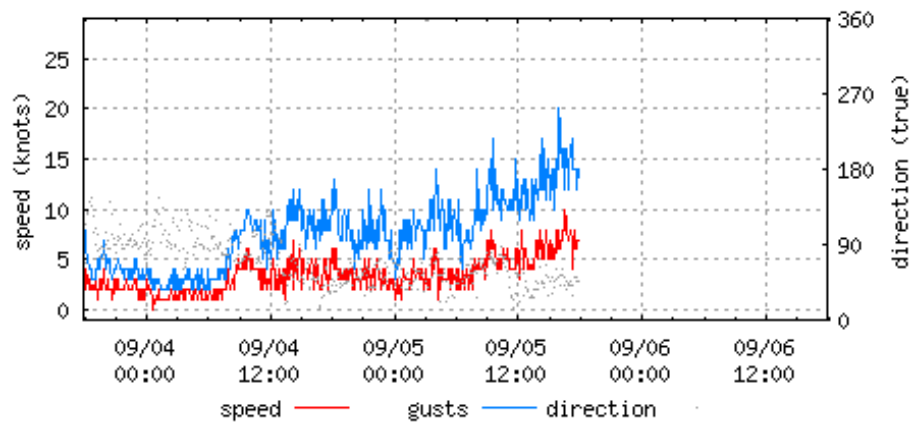
Observed: 0.33 ft. Predicted: -0.09 ft. Residual: 0.42 ft.

Historical Maximum Water Level: Sep 16 1995, 2.93 ft.

Next High Tide: 09/05/2017 20:58 (AST), 0.19 ft.

NOAA/NOS/CO-OPS 9751639 Charlotte Amalie, VI

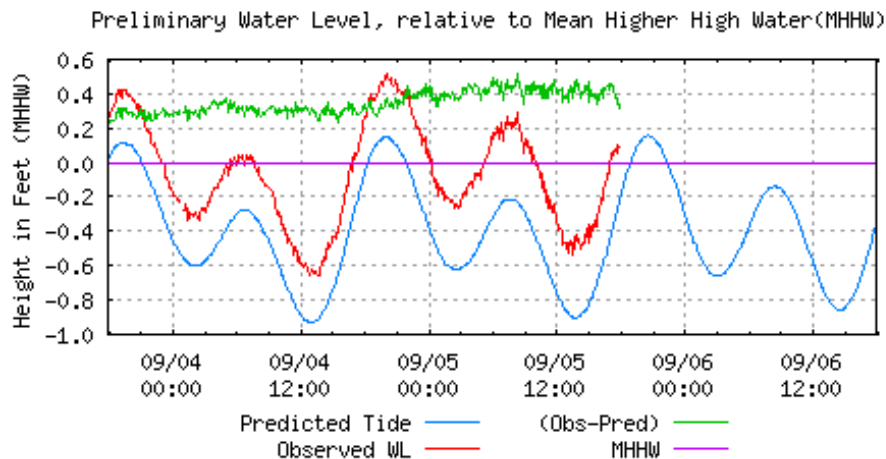
Wind Speed / Gusts / Direction



Last Observed Sample: 09/05/2017 17:48 (AST)

Wind Speed: 7 knots Gusts: 14 knots Direction: 47° T

NOAA/NOS/CO-OPS 9752235 Culebra, PR



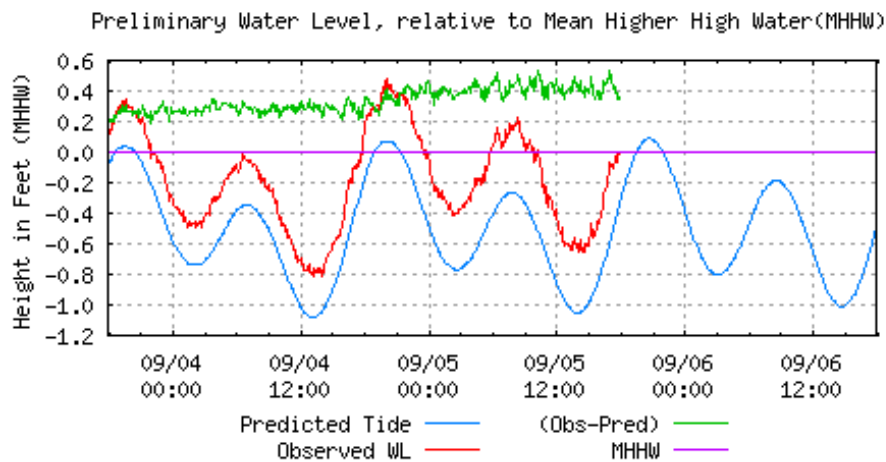
Last Observed Sample: 09/05/2017 17:48 (AST). Data relative to MHHW

Observed: 0.09 ft. Predicted: -0.23 ft. Residual: 0.32 ft.

Historical Maximum Water Level: Nov 6 2006, 0.84 ft.

Next High Tide: 09/05/2017 20:32 (AST), 0.15 ft.

NOAA/NOS/CO-OPS 9752619 Isabel Segunda, Vieques Island, PR



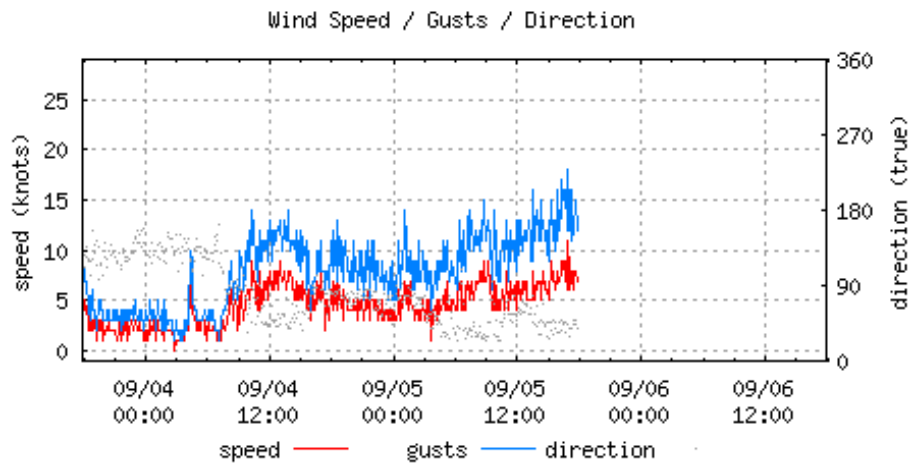
Last Observed Sample: 09/05/2017 17:54 (AST). Data relative to MHHW

Observed: -0.02 ft. Predicted: -0.33 ft. Residual: 0.31 ft.

Historical Maximum Water Level: n/a

Next High Tide: 09/05/2017 20:38 (AST), 0.09 ft.

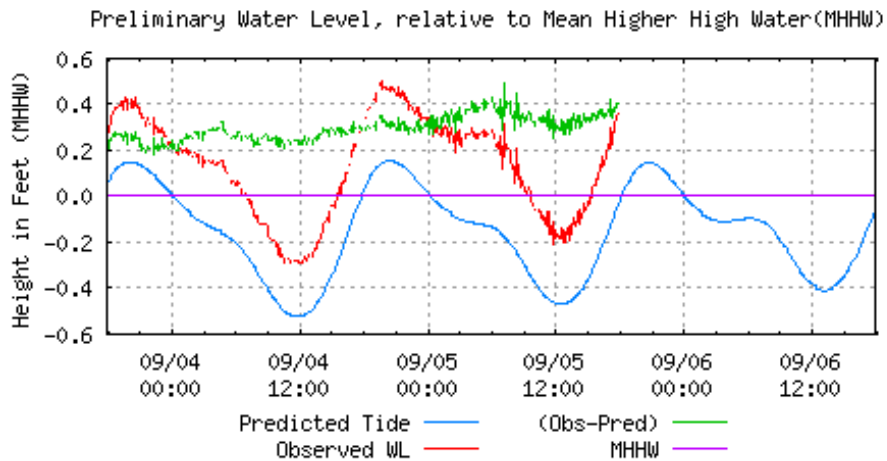
NOAA/NOS/CO-OPS 9752619 Isabel Segunda, Vieques Island, PR



Last Observed Sample: 09/05/2017 17:54 (AST)

Wind Speed: 7 knots Gusts: 13 knots Direction: 35° T

NOAA/NOS/CO-OPS 9752695 Esperanza, Vieques Island, PR



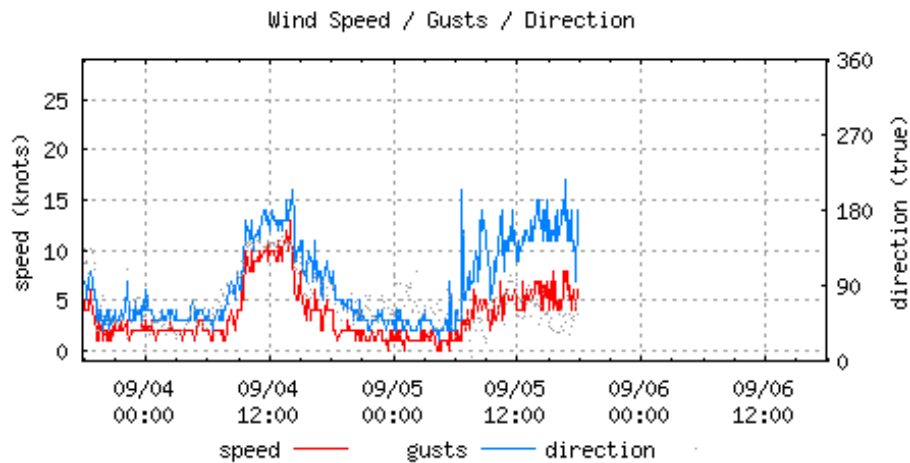
Last Observed Sample: 09/05/2017 17:54 (AST). Data relative to MHHW

Observed: 0.35 ft. Predicted: -0.03 ft. Residual: 0.38 ft.

Historical Maximum Water Level: Aug 22 2011, 0.99 ft.

Next High Tide: 09/05/2017 20:41 (AST), 0.15 ft.

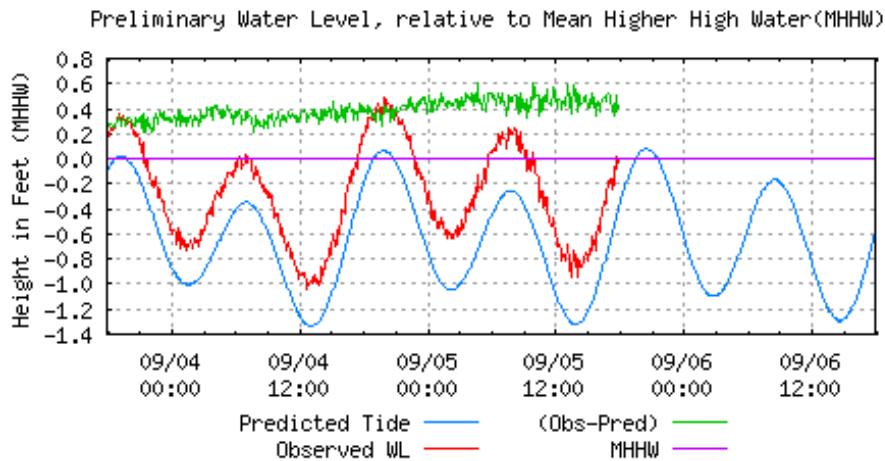
NOAA/NOS/CO-OPS 9752695 Esperanza, Vieques Island, PR



Last Observed Sample: 09/05/2017 17:54 (AST)

Wind Speed: 6 knots Gusts: 12 knots Direction: 58° T

NOAA/NOS/CO-OPS 9753216 Fajardo, PR



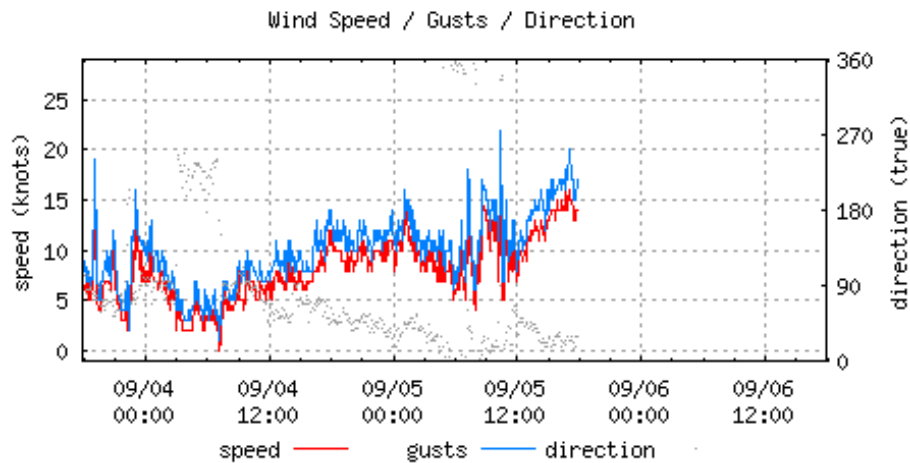
Last Observed Sample: 09/05/2017 17:54 (AST). Data relative to MHHW

Observed: -0.03 ft. Predicted: -0.39 ft. Residual: 0.36 ft.

Historical Maximum Water Level: Aug 30 2010, 0.84 ft.

Next High Tide: 09/05/2017 20:27 (AST), 0.08 ft.

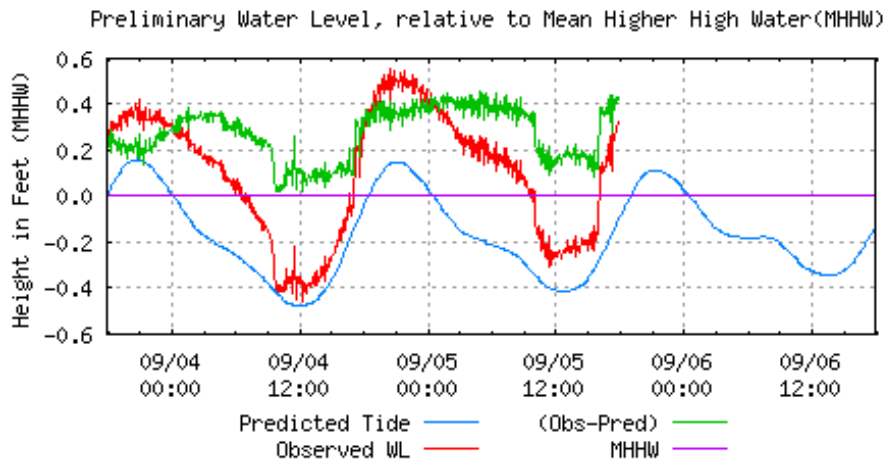
NOAA/NOS/CO-OPS 9753216 Fajardo, PR



Last Observed Sample: 09/05/2017 17:54 (AST)

Wind Speed: 14 knots Gusts: 16 knots Direction: 28° T

NOAA/NOS/CO-OPS 9754228 Yabucoa Harbor, PR



Last Observed Sample: 09/05/2017 17:54 (AST). Data relative to MHHW

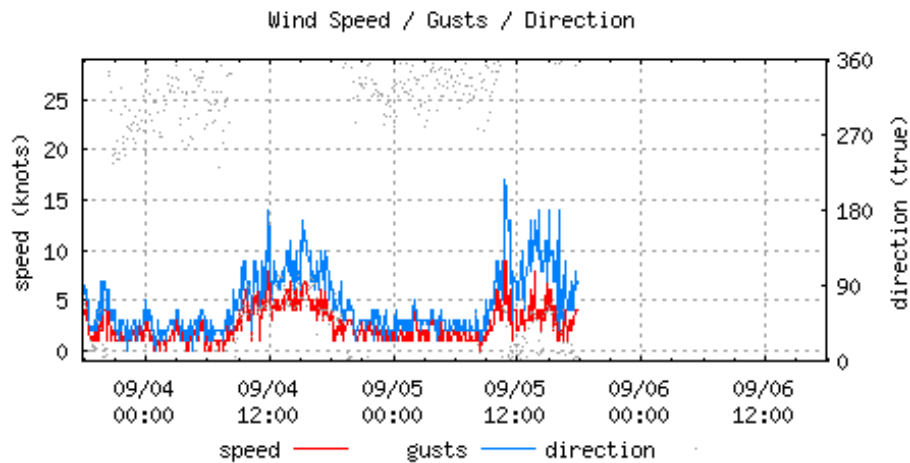
Observed: 0.26 ft. Predicted: -0.10 ft. Residual: 0.36 ft.

Historical Maximum Water Level: n/a

Next High Tide: 09/05/2017 21:17 (AST), 0.12 ft.



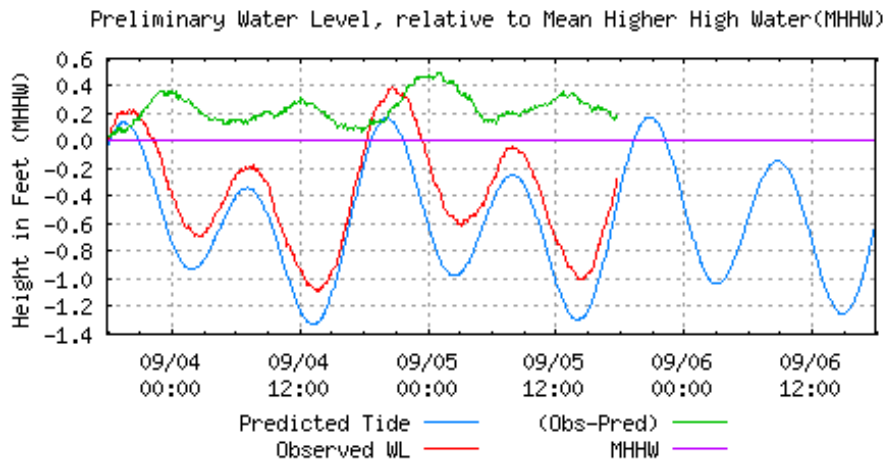
NOAA/NOS/CO-OPS 9754228 Yabucoa Harbor, PR



Last Observed Sample: 09/05/2017 17:54 (AST)

Wind Speed: 3 knots Gusts: 6 knots Direction: 6° T

NOAA/NOS/CO-OPS 9755371 San Juan, La Puntilla, San Juan Bay, PR



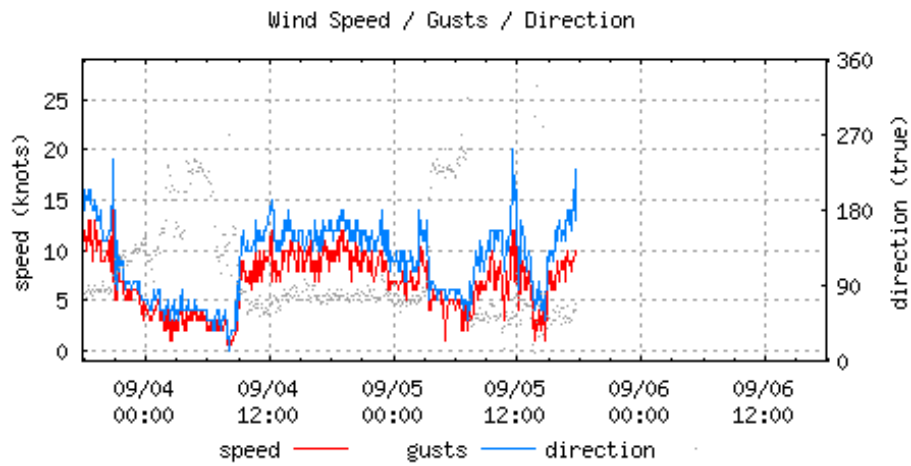
Last Observed Sample: 09/05/2017 17:48 (AST). Data relative to MHHW

Observed: -0.23 ft. Predicted: -0.42 ft. Residual: 0.19 ft.

Historical Maximum Water Level: Sep 18 1989, 2.77 ft.

Next High Tide: 09/05/2017 20:45 (AST), 0.17 ft.

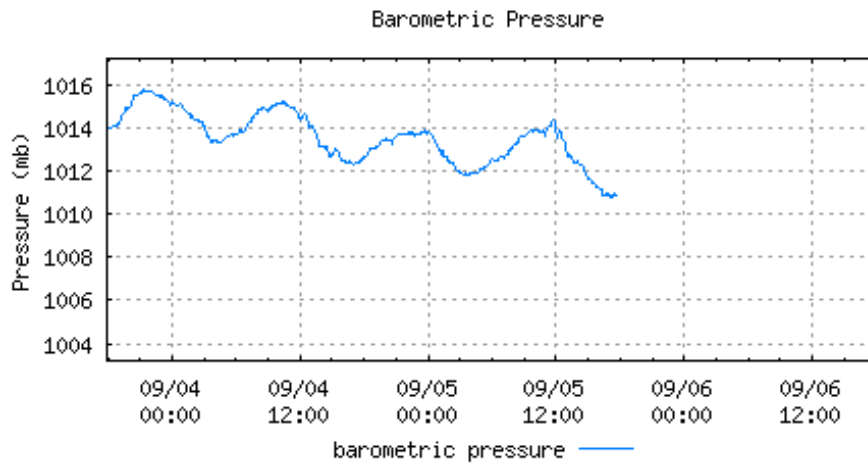
NOAA/NOS/CO-OPS 9755371 San Juan, La Puntilla, San Juan Bay, PR



Last Observed Sample: 09/05/2017 17:48 (AST)

Wind Speed: 11 knots Gusts: 15 knots Direction: 63° T

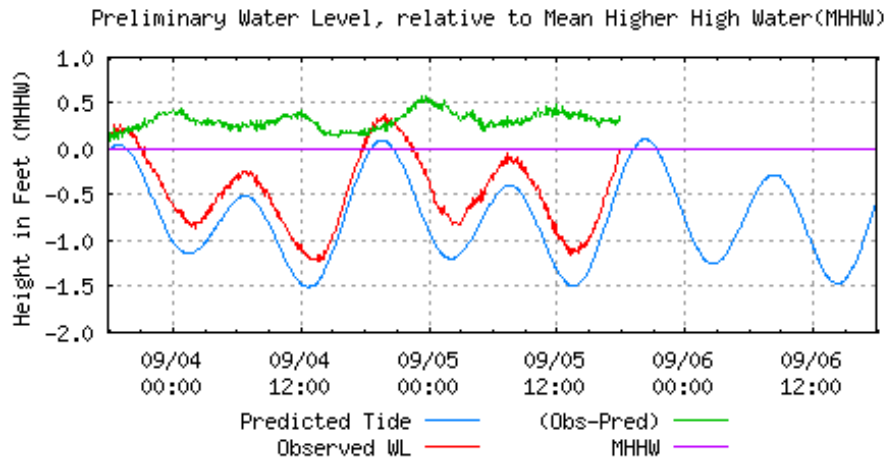
NOAA/NOS/CO-OPS 9755371 San Juan, La Puntilla, San Juan Bay, PR



Last Observed Sample: 09/05/2017 17:48 (AST)

Barometric Pressure: 1010.9 mb

NOAA/NOS/CO-OPS 9757809 Arecibo, PR



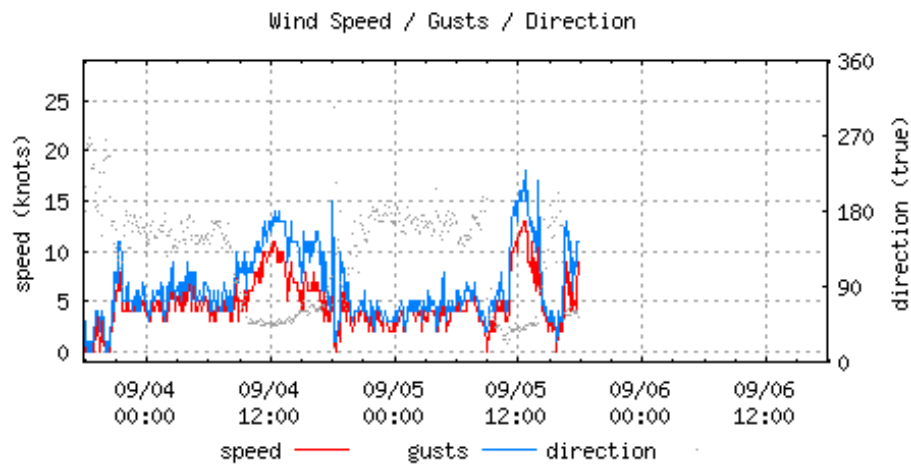
Last Observed Sample: 09/05/2017 18:00 (AST). Data relative to MHHW

Observed: 0.02 ft. Predicted: -0.31 ft. Residual: 0.33 ft.

Historical Maximum Water Level: Oct 8 2010, 0.90 ft.

Next High Tide: 09/05/2017 20:14 (AST), 0.10 ft.

NOAA/NOS/CO-OPS 9757809 Arecibo, PR

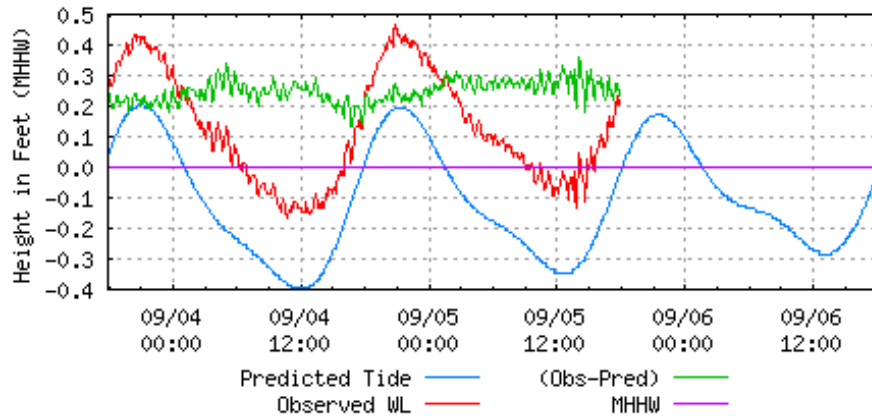


Last Observed Sample: 09/05/2017 18:00 (AST)

Wind Speed: 9 knots Gusts: 13 knots Direction: 45° T

NOAA/NOS/CO-OPS 9759110 Magueyes Island, PR

Preliminary Water Level, relative to Mean Higher High Water(MHHW)



Last Observed Sample: 09/05/2017 17:48 (AST). Data relative to MHHW

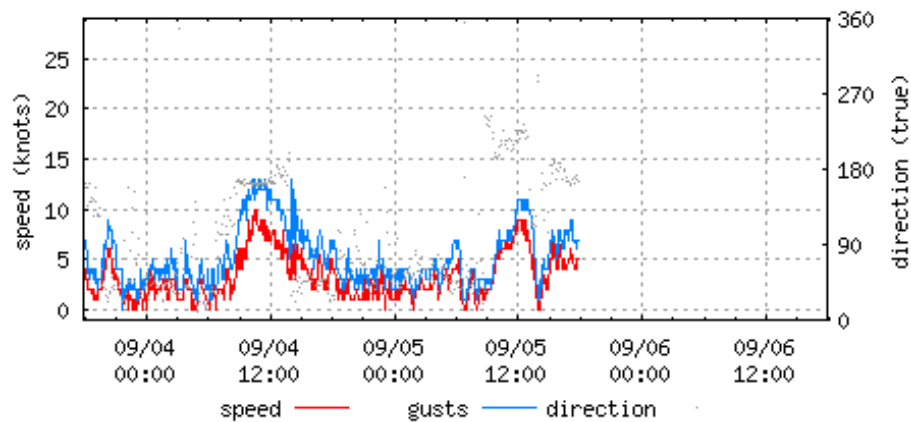
Observed: 0.20 ft. Predicted: -0.03 ft. Residual: 0.23 ft.

Historical Maximum Water Level: Sep 22 1998, 1.60 ft.

Next High Tide: 09/05/2017 21:30 (AST), 0.17 ft.

NOAA/NOS/CO-OPS 9759110 Magueyes Island, PR

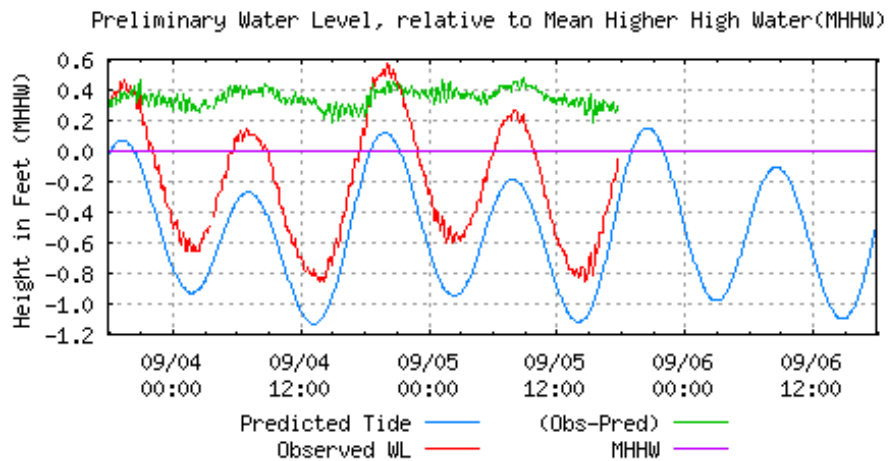
Wind Speed / Gusts / Direction



Last Observed Sample: 09/05/2017 17:48 (AST)

Wind Speed: 5 knots Gusts: 7 knots Direction: 165° T

NOAA/NOS/CO-OPS 9759394 Mayaguez, PR



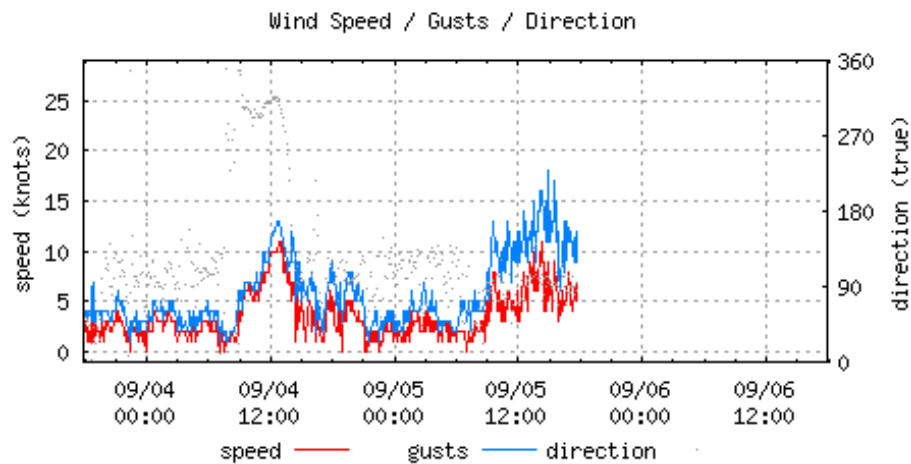
Last Observed Sample: 09/05/2017 17:48 (AST). Data relative to MHHW

Observed: 0.00 ft. Predicted: -0.32 ft. Residual: 0.32 ft.

Historical Maximum Water Level: n/a

Next High Tide: 09/05/2017 20:27 (AST), 0.15 ft.

NOAA/NOS/CO-OPS 9759394 Mayaguez, PR

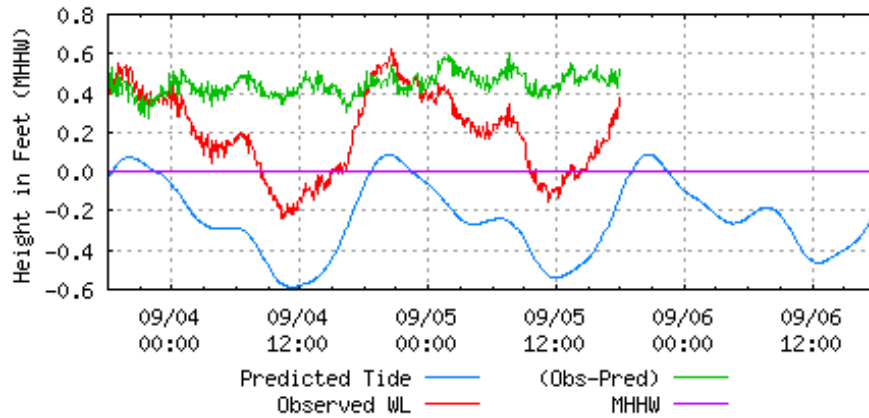


Last Observed Sample: 09/05/2017 17:48 (AST)

Wind Speed: 5 knots Gusts: 10 knots Direction: 84° T

NOAA/NOS/CO-OPS 9759938 Mona Island, PR

Preliminary Water Level, relative to Mean Higher High Water (MHHW)



Last Observed Sample: 09/05/2017 17:54 (AST). Data relative to MHHW

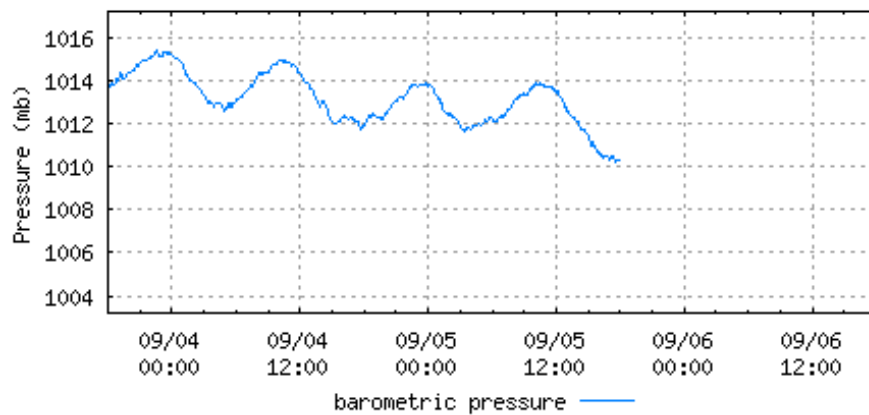
Observed: 0.38 ft. Predicted: -0.14 ft. Residual: 0.52 ft.

Historical Maximum Water Level: Dec 23 2010, 1.24 ft.

Next High Tide: 09/05/2017 20:39 (AST), 0.09 ft.

NOAA/NOS/CO-OPS 9759938 Mona Island, PR

Barometric Pressure



Last Observed Sample: 09/05/2017 17:54 (AST)

Barometric Pressure: 1010.3 mb

Latest Water Level Observations on MHHW

Station ID	Station Name	Date/Time	Observed Water Level	Predicted Tide	Residual Water Level	24 Hour Maximum Storm Tide
9761115	Barbuda	09/05/2017 17:48 (AST)	0.37 ft	0.05 ft	0.32 ft	0.70 ft
9751364	Christiansted Harbor, St Croix, VI	09/05/2017 17:48 (AST)	0.18 ft	-0.02 ft	0.20 ft	0.33 ft
9751381	Lameshur Bay, St John, VI	09/05/2017 17:54 (AST)	0.39 ft	-0.13 ft	0.52 ft	0.53 ft
9751401	Lime Tree Bay, St. Croix, VI	09/05/2017 17:48 (AST)	0.10 ft	-0.06 ft	0.16 ft	0.29 ft
9751639	Charlotte Amalie, VI	09/05/2017 17:48 (AST)	0.33 ft	-0.09 ft	0.42 ft	0.57 ft
9752235	Culebra, PR	09/05/2017 17:48 (AST)	0.09 ft	-0.23 ft	0.32 ft	0.52 ft
9752619	Isabel Segunda, Vieques Island, PR	09/05/2017 17:54 (AST)	-0.02 ft	-0.33 ft	0.31 ft	0.48 ft
9752695	Esperanza, Vieques Island, PR	09/05/2017 17:54 (AST)	0.35 ft	-0.03 ft	0.38 ft	0.50 ft
9753216	Fajardo, PR	09/05/2017 17:54 (AST)	-0.03 ft	-0.39 ft	0.36 ft	0.48 ft
9754228	Yabucoa Harbor, PR	09/05/2017 17:54 (AST)	0.26 ft	-0.10 ft	0.36 ft	0.55 ft
9755371	San Juan, La Puntilla, San Juan Bay, PR	09/05/2017 17:48 (AST)	-0.23 ft	-0.42 ft	0.19 ft	0.40 ft
9757809	Arecibo, PR	09/05/2017 18:00 (AST)	0.02 ft	-0.31 ft	0.33 ft	0.37 ft
9759110	Magueyes Island, PR	09/05/2017 17:48 (AST)	0.20 ft	-0.03 ft	0.23 ft	0.46 ft
9759394	Mayaguez, PR	09/05/2017 17:48 (AST)	0.00 ft	-0.32 ft	0.32 ft	0.57 ft
9759938	Mona Island, PR	09/05/2017 17:54 (AST)	0.38 ft	-0.14 ft	0.52 ft	0.63 ft

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